

CLAIMS

1. A method of measuring the amount of bran in rice washing water with which the rice has been washed, comprising:

measuring the intensity of fluorescence emitted by ferulic acid contained in the rice washing water when the rice washing water is exposed to ultraviolet light and the ferulic acid is excited by the ultraviolet light; and

determining the amount of bran in the rice washing water based on the measured value of the intensity of fluorescence.

2. The method of measuring the amount of bran according to claim 1, wherein the wave length of the ultraviolet light to which the rice washing water is exposed is in the range of 330 to 340 nm and the wave length of the fluorescence whose intensity is to be measured is in the range of 430 to 450 nm.

3. A method of evaluating the amount of bran remaining on sample rice, comprising:

measuring the intensity of fluorescence emitted by ferulic acid, which is contained in rice washing water with which the sample rice has been washed, when the rice washing water is exposed to ultraviolet light; and

determining the amount of bran contained in the sample rice by comparing the measured value of the intensity of fluorescence with the predetermined standard value.

4. The method of evaluating the amount of bran according to claim 3, wherein the wave length of the ultraviolet light to which the rice washing water is exposed is in the range of 330 to 340 nm and the wave length of the fluorescence whose intensity is to be measured is in the range of 430 to 450 nm.

5. An apparatus for measuring the amount of bran, comprising:
a rice washing container formed of a material transparent to both ultraviolet light and fluorescence;

a stirring device for stirring sample rice and water in the rice washing container;

an ultraviolet light source;

a fluorophotometer;

an ultraviolet light bandpass filter arranged between the rice washing container and the ultraviolet light source;
and

a fluorescence bandpass filter arranged between the rice washing container and the fluorophotometer;

wherein the ultraviolet light bandpass filter is set to pass light having wave length in the range of 330 to 340 nm and the fluorescence bandpass filter is set to pass light having wavelength in the range of 430 to 450 nm.

6. The apparatus for measuring the amount of bran according to claim 5, wherein the rice washing container is a prismatic four-face quartz cell and the direction in which the fluorophotometer receives fluorescence intersects at said

rice washing container almost perpendicularly with the direction in which ultraviolet light is irradiated.